The views expressed in this paper are those of the authorand do not necessarily reflect the views of the Department of Defense or any of its agencies. This document may not be released for open publication until it has been cleared by the appropriate military service or government agency.



ELECTE JUN 28 1990 COHESION: WHAT WE LEARNED FROM COHORT

BY

LIEUTENANT COLONEL KENNETH C. SCULL, IN

DISTRIBUTION STATEMENT A: Approved for public release; distribution is unlimited.

2 APRIL 1990



U.S. ARMY WAR COLLEGE, CARLISLE BARRACKS, PA 17013-5050

SECURITY CLASSIFICATION OF THIS PAGE (When Date Entered)

REPORT DOCUMENTATION PAGE		READ INSTRUCTIONS BEFORE COMPLETING FORM	
1. REPORT NUMBER	2. GOVT ACCESSION NO.	1 RECIPIENT'S CATALOG NUMBER	
4. TITLE (and Subtitle)		. TYPE OF REPORT & PERIOD COVERED	
COHESION: What We Learned from COHORT		Study Project	
		6. PERFORMING ORG. REPORT NUMBER	
7. AUTHOR(e)		8. CONTRACT OR GRANT NUMBER(*)	
LTC(P) Kenneth C. Scull			
9. PERFORMING ORGANIZATION NAME AND ADDRESS		10. PROGRAM ELEMENT, PROJECT, TASK AREA & WORK UNIT NUMBERS	
U.S. Army War College			
Carlisle Barracks, PA 17013			
11. CONTROLLING OFFICE NAME AND ADDRESS		12. REPORT DATE	
Same		April 90 13. NUMBER OF PAGES	
		29	
14. MONITORING AGENCY NAME & ADDRESS(If different from Controlling Office)		15. SECURITY CLASS. (of this report)	
		Unclassified	
		154. DECLASSIFICATION/DOWNGRADING SCHEDULE	
16. DISTRIBUTION STATEMENT (of this Report)		<u> </u>	
Approved for Public Release, di	etribution is un	limitod	
Approved for Public Release; distribution is unlimited.			
17. DISTRIBUTION STATEMENT (of the abetract entered in Block 20, if different from Report)			
18. SUPPLEMENTARY NOTES			
10. SUPPLEMENTARY NOTES			
19. KEY WORDS (Continue on reverse side if necessary and identify by block number)			
20. ABSTRACT (Continue as reverse eigh if recessary an	e identity by block number)		
In 1981 the Chief of Staff of the Army decided to change the Army			
personnel management system in order to foster greater unit bonding,			
cohesion, self-confidence, and trust. The Army instituted the Unit Manning			
System (UMS) and its principle co	omponent the COHO	ORT (Cohesion, Operational	

Readiness, Training) unit replacement system. Its purpose was to reduce soldier turbulence by keeping soldiers together in the same unit for longer periods. The Army applied the new system in forming combat arms companies and battalions. Much theory and experience supported the validity of this concept as a means for improving both unit cohesion and potential combat performance. Nevertheless, not all results exonerated the new system and in 1986 the Army abandoned large scale application of the original COHORT concept replacing it with package replacement systems that evolved into another form of the individual replacement system which COHORT was designed to replace. One case that demonstrates well the advantages and limitations discovered in the application of COHORT methodology involved the conversion of the 7th Infantry Division to the "light" configuration using COHORT principles. This information, amid-other sources provide enduring bessons are garding personnel management and preparation for war.

USAWC MILITARY STUDIES PROGRAM PAPER

The views expressed in this paper are those of the author and do not necessarily reflect the views of the Department of Defense or any of its agencies.

This doc sent may not be released for open publication until it has been cleared by the appropriate military service or government agency.

COHESION: WHAT WE LEARNED FROM COHORT

An Individual Study Project Intended for Publication

by

Lieutenant Colonel Kenneth C. Scull, IN

Colonel Richard H. Goldsmith Project Advisor

DISTRIBUTION STATEMENT A: Approved for public release; distribution is unlimited.

U.S. Army War College Carlisle Barracks, Pennsylvania 17013 2 April 1990



Acces	ion For		
	CRA&I	8	
DTIC		Ð	
Unannounced Justification			
Justinica (IDI)			
Ву			
Distribution /			
Availability Codes			
Dist	Avail 1		
.			
A-1			

ABSTRACT

AUTHOR:

Kenneth C. Scull, LTC, IN

TITLE:

COHESION: What We Learned From COHORT

FORMAT:

Individual Study Project Intended for Publication

DATE:

2 April 1990

PAGES: 28

CLASSIFICATION: Unclassified

In 1981 The Chief of Staff of the Army decided to change the Army personnel management system in order to foster greater unit bonding, cohesion, self-confidence, and trust. The Army instituted the Unit Manning System (UMS) and its principle component, the COHORT (Cohesion, Operational Readiness, Training) unit replacement system. Its purpose was to reduce soldier turbulence by keeping soldiers together in the same unit for longer periods. The Army applied the new system in forming combat arms companies and battalions. Much theory and experience supported the validity of this concept as a means for improving both unit cohesion and potential combat performance. Nevertheless, not all results exonerated the new system and in 1986 the Army abandoned large scale application of the original COHORT concept replacing it with a package replacement system that has evolved into another form of the individual replacement system which COHORT was designed to replace. One case that demonstrates well the advantages and limitations discovered in the application of the COHORT methodology involved the conversion of the 7th Infantry Division to the "light" configuration using COHORT principles. This information and other sources provide enduring lessons regarding personnel management and preparation for war. (SXV)

INTRODUCTION

This article will review selected aspects of the Army leadership's efforts to change the concept used to initiate, integrate, train, and retain soldiers in Army combat units during the 1980s. The focus of the case is the implementation of the Army's new Unit Manning System (UMS) and particularly the unit replacement aspect of the UMS known as COHORT (Cohesion, Operational Readiness, Training).

The UMS, instituted in 1981, was an attempt to reduce personnel turbulence in Army combat battalions and companies by keeping soldiers and their leaders together in the same units for a longer time. By creating more stable units, Army leaders envisioned opportunities to improve the quality of combat forces by:

- -Promoting better interpersonal bonding among soldiers and between soldiers and leaders.
- -Enhancing unit training.
- -Increasing soldier commitment to the unit mission.
- -Developing a greater sense of <u>esprit de corps</u> among unit members.²

Conceived in 1981 by General Edward C. Meyer, then Army Chief of Staff (CSA), the COHORT unit replacement system was based on recommendations developed by the Army Cohesion and Stability Task Force (ARCOST) and derived from other sources interested in improving Army performance and competence. Meyer's vision was that Army personnel management policies ought to foster unit bonding, cohesion, competence, self confidence, and trust in combat units that would "ensure effective combat performance and organizational coherence while avoiding high levels of psychological breakdown in battle." The original concept was to develop company-size units made up of first term soldiers who received initial entry (IET) training as a group and subsequently were joined by a separately formed cadre of officers and noncommissioned officers (NCO). This scheme initially involved only combat

arms companies; infantry, armor, field artillery, and air defense artillery. (Army leaders consistently advocated extending COHORT to combat support and combat service support organizations when practical, although this never occurred.)

After formation, the Army stationed these companies with Army divisions located at posts in the continental United States (CONUS). The battalion integrated the COHORT company as a subordinate unit. Under the original concept, battalions contained a mixture of COHORT and nonCOHORT companies. COHORT companies existed for three year 'life cycles' geared to the first term soldier's enlistment. In many cases, the companies deployed overseas for part of the life cycle --Korea for 12 months or Europe for 18 months-- to join battalions already overseas. At the end of the COHORT life cycle, the unit disestablished as soldiers left the Army, reenlisted to become cadre in other units, or moved to assignments away from combat arms units. A newly formed company at the beginning of its three year life cycle would replace the disbanded company. After complete conversion to the new system, all companies in a combat battalion would be in some phase of its particular COHORT life cycle.

Impressed with the promising trends during initial trials, Army leadership optomistically expanded the program in 1984 by reorganizing eight combat battalions under the COHORT system. This scheme required the stabilization of large groups of cadre and leaders to receive the soldiers from IET stations. Like the company-size counterparts, some COHORT battalions deployed overseas and all disbanded or reorganized at the end of the three year life cycle. As part of the 1985 decision to form light infantry divisions the CSA opted to organize all the divisional combat battalions of the new 7th Infantry Division (Light) [ID(L)] using COHORT principles.

WRAIR COHORT ANALYSIS

Because COHORT's success or failure would be measured largely in behavioral terms, Army leaders tasked the Walter Reed Army Institute of Research (WRAIR) to monitor and evaluate the human dimensions involved in its implementation. WRAIR consists of professional behavioral scientists and researchers with the mission of providing insight into human behavioral dimensions of Army life. The WRAIR study, which continues today, provided useful feedback to Army leaders about the impact of the COHORT program on soldier morale and unit cohesion while also providing a broad-based look at human dimensions across the entire Army.

The primary vehicle for the WRAIR field evaluation was an extended project seeking to quantify and compare certain information about COHORT units and selected nonCOHORT counterparts. The assessment sought to answer the question "What are the effects of COHORT on soldiers and their units?" Another objective of this broad-based research was to develop reliable and valid measures of soldier cohesion and attitudes. This concept, known as "soldier will", includes the various human dimensions associated with individual combat readiness and psychological sustainability in combat. TWRAIR developed a survey questionnaire to measure soldier will and combined this objectively collected information with comprehensive interviews with COHORT soldiers and leaders to develop profiles of unit cohesion.

THE CASE FOR COHESION

The idea that the Army's personnel system should encourage individual and unit performance is not new. The ancients realized the value of the close presence of comrades as important to battlefield success. Before the advent of modern warfare, maintaining the integrity of one's line of battle was the ultimate measure of combat performance. The legions

of Rome trained and organized to ensure the indissolubility of the cohort and century (subdivisions of the legion). Legionnaires were drilled to "teach soldiers to keep their ranks and never abandon the colors (unit standards)".⁴ Vegitius, who wrote of things military in the fourth century, added that soldiers thus trained could remain steady even amidst the great confusion of hand to hand combat.⁵

As war evolved, theories of military success and failure emerged from great thinkers, soldiers, and political scientists of each era. Analysis of the campaigns of the Great Captains produced principles of war that, when properly applied, were thought to make assure success. Some of the most noteworthy theorists tended to reduce war to little more than a gigantic chess game played by the kings and strategists of the day. This trend away from articulating modern war in more humanistic terms continues today.

Analysis of contemporary warfare most frequently evolves to consideration of issues of strategy, weapons and material, technology, and manpower levels. Discussion seldom centers on the fate or feelings of the fighting man while engaged in actual combat.⁶ This latter day inability to deal consistently and effectively with the human element in combat is understandable considering modern society's emphasis on rationality and technology contrasted with the chaos and illogic of batle. Utterances of wartime commanders, detailed operational plans, after action reports, assembly and departure points, phase lines, objectives, artillery programs, all provide comforting structure and organization for those who seek to understand how war works. Analytical discussions about the details of combat, however, usually take place far from the battlefield and the uncertainties that accompany the fog of war.⁷ Notwithstanding the physical description of battle, human parameters serve to explain more succinctly and more aptly the conditions and limits of the battlefield. All those who man the accounterments of war -- soldiers, leaders, teams, and squads-- are first of all people with their own unique collection of abilities, feelings, fears, convictions, and doubts. Their capacity to confront the stresses of military service and particularly their capability to

cope with lethal combat are the departure points for all other studies of war. The COHORT replacement system sought to reimpose this idea on the Army's system for manning its most potentially demanding positions.

STUDY OF MAN IN MODERN BATTLE

No discussion of the importance of man on the battlefield is complete without the perspective provided by the writings of Colonel Ardant du Picq. Du Picq was an obscure nineteenth century French infantry officer who authored only one pamphlet published almost thirty years after his death. Nevertheless, du Picq's ideas, methods, and importance as a military thinker endure. His short treatise, <u>Battle Studies</u>, <u>Ancient and Modern</u>, touched on many areas of military study; tactics, organization, modern weapons, combined arms warfare, strategy, leadership, discipline, and modern versus ancient combat. Ardant du Picq's underlying thesis remained the same:

One thing does not change, the heart of man. In all matters which pertain to the Army...the human heart at the supreme moment of battle is the basic factor.⁸

Du Picq spent fourteen of his twenty-six years military service commanding French soldiers and colonial legions involved in numerous wars and campaigns. He had seen death many times and his writing is filled with first hand experiences and observations gathered in an active career. He also studied the battle accounts of the ancient Romans and Greeks because he was convinced that ancient warfare emphasized the importance of the individual; and, writings about ancient battles described more clearly the circumstances which resulted in fear, victory, bravery, and slaughter. He felt justified in extrapolating from his studies of the ancients, tying ancient to modern times using man as the common thread.

Centuries have not changed human nature. Passions, instincts...may be manifested in various ways according to time, place, the character and temperament of the race...at the bottom is found the same man.⁹

Besides his broad experience and affinity for studying ancient battles, Ardant du Picq pioneered a third source for his study. He sent questionnaires to his contemporaries who had led in combat. Du Picq's objective was to learn minute details of combat actions in order to gain insight into how men reacted on the "modern" and more lethal battlefield that included accurate, rapid fire small arms and artillery. The French officer corps received the questionnaire unenthusiastically largely because of their reluctance to discuss the ugly and mundane --even dishonorable-- battle details such as loss of control, unnecessary casualties, and unsuccessful leadership methods. Du Picq felt strongly that he could faithfully determine the truth about how man reacted in modern combat only by gathering and studying what most considered insignificant trivia. Du picq's pioneering questionnaire and post-combat interview endure as the beginning of modern military sociology.

Most germane to the present discussion were du Picq's proposals about the importance of morale and cohesion. He wrote:

Four brave men who do not know each other will not dare to attack a lion. Four less brave men, but knowing each other well, sure of their reliability and consequently mutual aid, will attack resolutely.¹⁰

He was persuaded that cohesion could neutralize the effects of dispersion required to counteract the lethality of modern weapons. Furthermore, because of this battlefield dispersion, men in battle were not otherwise under direct control of their commanders. Du Picq professed that a combination of official sanctions and social reproach by a small group of peers would have to replace the discipline of massed formations. Such a sense of discipline and cohesion takes time to develop and

...includes confidence in [his] comrades and the fear of reproaches and retaliations if he [the soldier] abandons them in danger; his desire to go where others go without trembling more than they...in a word esprit de corps.¹¹

Du Picq consequently valued stability in combat units inferring that wise organizations change as little as possible so that comrades during peacetime maneuvers will also be comrades in war.¹²

LEGACY OF STUDYING MAN IN WAR

The psychological and sociological health of the U.S. military has has been the object of recurring debate and study. Broad-based interest in the performance of the Army in combat followed each of the country's wars this century, especially after shortcomings in soldier performance became public during the Vietnam and Korean conflicts. Seminal works in this field include Stouffer's The American Soldier, a World War II compilation of attitudes taken from surveys of combat troops prior to and after the invasion of Normandy. These studies attempted to correlate soldier attitudes with unit performance in combat. Commissioned by General George Marshall, Stouffer investigated the relationships between loyalty to buddies, pride in the unit, attitudes about leaders, and willingness to go into combat. He found that loyalty to comrades generally rested upon mutual dependence in the face of combat hazards. Stouffer concluded, among other things, that soldiers who had fought together were more likely to be proud of their companies than members of unblooded units. These multi-faceted studies set a precedent for the analyses that continue in the WRAIR Soldier Will Survey. Interestingly, the Army leadership was very reluctant to accept the published results from Stouffer's work. To the generals, the findings apparently sounded more like familiar GI griping than useful insights into the psychological state of the combat soldier. 13

While military leaders greeted Stouffer's work with relative skepticism and ambivalence, Brigadier General S.L.A. Marshall's observations received the attention and admiration of the Army and broadly influenced training and doctrine. Marshall's classic study of World War II soldiers in combat, Men Against Fire, convincingly related combat performance to precombat factors including leader selection, training practices, and unit morale. Marshall relied

on research techniques that featured post-action interviews with battle participants. These discussions, hard on the emotion and confusion of combat, not only provided details of the action but also explored the feelings and attitudes of those directly involved. Because Marshall was a military man, because he wrote with informed authority, and because their experience corroborated his findings, Army leadership in the post WW II era embraced most of his primary theses. Marshall's credibility grew as many of his theories appeared to be borne out by soldier actions during the Korean conflict in the early 1950's.

Men Against Fire talked about the primacy of the group in motivating soldier combat performance, the reluctance of infantrymen to fire their weapons, and the delicate character of soldier morale. Marshall's studies confirmed that leader involvement in coordinating individual soldier activity was essential; and confidence in one's comrades was a prerequisite trait of an effective fighting unit.

It is noted as a principle that...the tactical unity of men working together in combat will be in ratio to their knowledge and sympathetic understanding of each other. Lacking these things, though they be well trained soldiers, they will not likely adhere [in combat].¹⁴

I hold it to be one of the simplest truths of war that the thing which enables an infantry soldier to keep going with his weapon is the near presence or the presumed presence of a comrade...It is that way with any fighting man. He is sustained by his fellows primarily and by his weapon secondarily...He would rather be unarmed and with comrades around him than altogether alone, though possessing the most perfect, quick-firing weapon.¹⁵

Even as Marshall wrote and lectured on the centrality of the man on the battlefield, the military and civilian administrations grew more enamored of the potential impact of technology on wars of the future. With the specter of the atomic bomb, jet aircraft nuclear naval vessels, and intercontinental ballistic missiles, the role of the infantry soldier was called into serious question by Congress, the press, and sister Services more oriented toward technology and high priced equipment. Military and civilian leaders developed defense

policies based on technological advances, popular conceptions of future war, and the role the military ought to assume in modern society. These decisions and policies affected the Army dramatically.

Advocates of organizational efficiency increasingly applied industrial management theory to the direction of the Armed Forces. As the Army's organizations and systems grew more complex, personnel managers came to view soldiers as interchangeable parts coming off an inexhaustible assembly line fed by the two year draft. Military service began to be regarded more as a job than a special, professional way of life. Meanwhile the draft filled the Army of the Fifties with technicians generally uninterested in the bleak prospects and untechnical milieu of the foot soldier. In the face of these modern practices, Marshall warned as early as 1947 that thoughtless, "more efficient" personnel policies--from assignments based on specialist classification to redesignation of historically proud units--were destroying the fabric of the Army. He suggested that policy advanced by the Army leadership be based more on "knowledge of the human heart" than upon impersonal slide rule calculations. 17

The COHORT replacement system evolved specifically to counteract the legacy of fifty years of the individual replacement system (IRS). The IRS assembly line, widely criticized from WW II to Vietnam, persisted with all its notable deleterious effects because its perpetuation to supported two preeminent American values, fairness and efficiency. These merits notwithstanding, individual manning systems created significant personnel problems both in peacetime and war.

In his detailed study of men in battle through the ages, <u>Acts of War</u>, Richard Holmes criticizes the individual replacement system as the source of many modern military ills. He asserts that the high level of psychiatric breakdown of American forces in Europe during WW II (10 per 1000) was due to the American wartime replacement system. Units were kept in the line indefinitely with individual replacements filling in as the need arose. Two consequences

resulted; the soldier was fighting along side strangers and, as he soon realized, the infantryman was committed until he dropped.¹⁸ Escape was by litter or grave.

The policies of rotation applied variously during the Korean and Vietnam wars were versions of the IRS with their own pernicious effects. Under these systems the individual joined the unit for a certain predetermined length of time or was required to stay in the combat zone until accumulating enough "points" to go home. The rotation policy helped lower the psychiatric casualty rates incurred by U.S. soldiers during those conflicts; however, this particular adaptation created its own set of problems. The Korean War provided more warnings that individual replacement undermined morale. In the book, Pork Chop Hill, the prolific Marshall reinforced his earlier observations arguing that rotation (of individuals):

..sacrificed most of the traditional values, such as earned promotion and citation, pride in unit, and close comradeship, which were supposed to keep him [the soldier] steadfast.¹⁹

As the United States moved to a broader combat role in Vietnam, the military and civilian leadership responsible for committing the forces consisted overwhelmingly of managerial bureaucrats who saw this new kind of war as an opportunity to "manage away the enemy by timely and appropriate application of lethal resources." No form of unit rotation as a system of replacement was ever seriously considered or tried. As the war continued, the deleterious effects of the one year individual tour contributed to the loss of unit morale and poor Army performance characterized by the latter years of U.S involvement. As the Vietnam conflict ended, critics both within and outside the Army attempted to ascertain why the Army had begun to disintegrate.

That the U.S. Army had begun to fall apart under the relatively minimum stress of the Vietnam War is a widely held view among military critics and other observers. Richard Gabriel's <u>Crisis in Command</u> points to the many indicators that Army morale and discipline failed during Vietnam. Prominent among the evidence were widespread desertion, drug

addiction, assaults on leaders, and combat refusals.²⁰ There were many possible explanations; length of the war, apparent political futility, inequitable draft, and lack of support from home. Gabriel also suggested that the manning system resulted in lack of cohesion among line soldiers and their leaders. Rotation into the squad, team, or platoon by individual soldiers unfamiliar with the veteran troops occurred without adequate time for training and assimilation into the organization. Too often these "newbies" became the objects of frustration, suspicion, and fear. Officers rotated more often than their men, frequently to take staff positions perceived by soldiers as being less dangerous. The impression that some leaders were not sharing equally in the dangers of the battlefield contributed to the lack of bonding between leader and led which is necessary in effective fighting military organizations.

During the 1970's military leaders began to heed the counsel of these criticisms and to look for programs and policies designed to remedy some of the most nagging problems. General Meyer's determination to reduce peacetime turbulence within combat units and to develop a true unit replacement system was central to personnel policy reform. COHORT was the manifestation and direct result of the Army's desire to correct these systemic deficiencies.

COHORT AND THE LIGHT INFANTRY EXPERIMENT

In April 1984 General John A. Wickham promulgated a Chief of Staff "White Paper" announcing that the U.S. Army would organize several light infantry divisions. The CSA intended for light infantry divisions to be smaller and more deployable than heavier infantry and armored forces. The light infantry, however, would retain significant ability to fight in all combat environments. The light units were to be characterized by foot mobile, aggressive soldiers and leaders capable of sustained, independent operations over extended times and distances. The addition of these new type combat divisions would involve the conversion of

several conventionally organized infantry divisions and the creation of two others. General Wickham's directions included descriptions of how these units would train, deploy, man, equip, and maintain. He declared that "soldier power" would be the key to developing a high performing unit "capable of bold, aggressive action under conditions of great hardship and risk." The White Paper defined soldier power as:

...the synergistic combination between intensive, progressive training vigorously focused on the combat mission, experienced leadership, horizontal and vertical cohesion, and supportive relationships between unit and family.²¹

The first unit to be converted was the 7th Infantry Division located at Fort Ord, California. At that time the 7th was a conventionally organized infantry formation with approximately one-third of its strength in the reserve components. Because its traditional mission to reinforce overseas forces required less readiness, the division held relatively low priority for men and equipment. The conversion began in the summer of 1984 and units were formed and began serious training in the early Spring of 1985. General Wickham, a long time proponent of the UMS, was specific in his direction regarding how COHORT would be used to man the new units. He had watched the COHORT program closely from its inception and was encouraged by positive reports. He saw more cohesive units as one of the keys to soldier power.

COHORT will allow horizontal and vertical bonding from initial entry training through deployment to combat. Within this environment, cohesion--the powerful, intangible combat multiplier-will help produce tight knit, self confident, competent units capable of withstanding the most demanding stresses of war.²²

The 7th ID(L) was the first to have all combat battalions formed using COHORT principles and the first to have complete battalions in which all first term soldiers in high density specialties were trained in a one station unit station training (OSUT) program (a form of IET discussed earlier). Leaders, both officers and NCOs, assembled several months before the troops arrived. These leaders received intensive, specialized training in order to be more

prepared to lead and train the arriving soldiers after their graduation from OSUT and arrival at Fort Ord. Because the intent was to create high performing units from "ordinary soldiers", no particular screen was used to ensure only top quality, proven infantry and artillery NCOs and officers would cadre the new battalions. In some cases, personnel managers forced unwilling or marginal NCOs into leadership positions. Although the leaders themselves had not been hand picked, they would be held to a standard alluded to in the CSA's White Paper:

Superb leaders, fighting soldiers, and tough training will be the hallmarks [of light infantry units]. Leaders will demand the highest levels of performance and discipline from soldiers...But above all, the leaders will have the high personal courage to inspire in their subordinates the respect and daring essential for victory under arms.²³

In the summer and fall of 1984, the Army recruited and began training the soldiers for the 7th ID(L). The soldiers enlisted for the COHORT "option" (not fully aware of what all that entailed) which guaranteed three years in the same unit stationed at Fort Ord after graduation from OSUT. Recruiters also stressed to varying degrees the uniqueness, challenge, and importance of the light infantry to the Army of the future. The individuals who enlisted for the COHORT units in the 7th ID(L) enjoyed the reputation from the outset for being more motivated than the average nonCOHORT soldier.

MISSION: CONVERSION TO LIGHT

The 7th ID(L) gained multiple missions related to the conversion to the new force design. Most of these tasks required, or were perceived to require, immediate demonstration of relatively error free performance rather than progressive development. Army leaders desired that the division convert to light configuration with minimal loss of combat readiness. Beside turning in unneeded or obsolete equipment and drawing new items more suitable for light forces, each combat unit (infantry and field artillery battalion) was remanned in order to accommodate the new COHORT soldiers and the newly formed and trained cadre of leaders.

At Fort Ord the new troops began training immediately in order to bring the battalions to full combat readiness at the earliest date. Furthermore, the division reorganization included the addition of a third brigade (approximately four battalions) increasing the strain on the post which lacked much of the support structure (like housing) required to sustain a more robust divisional unit.

After conversion, the second major mission for the 7th ID(L) was light infantry certification. The purpose of this demanding sequence of training events was to test the organization in extended, simulated combat in order to verify the utility and adequacy of light infantry concepts and design. It remained essential for the certification to go forward rapidly in order to provide a blueprint for the conversion of other divisions to light design.

In the winter of 1985-1986, the division added a rapid deployment force (RDF) mission. The RDF mission required that certain units be on short notice recall (usually two hours) for immediate staging and deployment into potential combat. While RDF deployment for combat is rare, the system for alert and recall is exercised frequently with no-notice readiness checks and training deployments. The RDF mission was also critical because the light divisions were now being targeted against regions where major U.S. interests were frequently threatened.

In addition to the above tasks, the CSA chartered the new light division to generate fighting power with "greater reliance on people rather than material and weapon systems." This third mission, to build a division on the strength of its superior human dimensions, would evolve from a combination of stabilized COHORT battalions, intense training, and a "paradigm of positive leadership [designed] to develop high performing divisions" without recourse to volunteers, highly specialized skills, or special personnel screenings.²⁴

The 7th ID(L) success in converting to light design and leading the rest of the Army in this important endeavor was extraordinary. From essentially a standing start the division stood

certified, capable, and well-trained by any measure after just 18 months. Nevertheless, to accomplish all of these missions something had to give and the price was paid in human capital. The toll on the intended gains in the human dimension was heavy and surprising.

MEASURING COHESION IN THE 7TH ID(L)

The Department of the Army tasked WRAIR to evaluate the human dimensions in the first light infantry division. WRAIR's previous efforts to develop effective tools and systems for measuring soldier will were well recognized and respected around the Army. Furthermore, the Army leadership's vision for the light infantry clearly called for a human dimension revolution in the light units. WRAIR carried out this task by expanding research on cohesion and its UMS field evaluation to examine soldier-soldier, soldier-leader, and unit family relationships in selected units of the 7th ID(L). Researchers selected four "all COHORT" battalions for evaluation; three infantry rifle battalions and a fourth field artillery battalion.

The sources of information were soldiers of all ranks in the four battalions as well as commanders and staff from higher headquarters and spouses of soldiers in the units. Data collection methods included the Soldier Will Survey, interviews, and participant observations. The research team expanded the role of the interview as a method for gathering data because talks with the participants provided the best insights into uneven results on survey responses. During the first eighteen months of the evaluation, interviewers talked to more than 900 soldiers in all ranks and over one hundred spouses. The results of these interviews provided helpful explanations of how the human dimension issues developed and were resolved during the conversion and certification of the division. WRAIR assured all interviewees and survey respondents that their comments and questionnaire responses would remain confidential and only nonattributive information would be grouped or trend data provided for the sake of analysis.

Data collectors conducted the first Soldier Will Survey and interviews of the subject units

during the period Jul-Sep 1985, six to eight months after the units formed and began training at Fort Ord. During this period the companies and battalions worked to develop as teams from squad to company, with focus on the smaller units. The training was difficult and intense with little respite.

The second iteration of surveys and interviews took place approximately six months later (Feb-Apr 1986). During the intervening period the division scheduled several large off post exercises to certify light infantry concepts and design. Also, the RDF mission became active creating additional stress on soldiers and families because of frequent alerts and greater limitations on non-duty activities. The surveys and particularly the interviews reflected the cumulative effect of these expanded missions.

SOLDIER WILL SURVEYS AND INTERVIEWS

For the light infantry division evaluation, qualitative results from the interviews assumed an increasingly important role; however, the efforts in developing a useable Soldier Will Survey paid off during the 7th ID(L) evaluation. Soldier Will Survey findings were compared with other COHORT units (not light infantry) and conventionally manned, nonCOHORT units. No other CONUS-based, nonCOHORT, light infantry battalions were available to serve as duplicate control units against which to compare 7th ID(L) findings. However, by the time researchers conducted the 7th ID(L) evaluation, more than 20,000 respondents had participated in the Soldier Will Survey providing an extraordinary data base for comparison of unit behavior across the Army. The quantitative measures provided in the WRAIR report on the 7th ID(L) human dimensions were brief including only comparative measures of horizontal and vertical cohesion.

Horizontal cohesion consists of two factors: caring among soldiers and provision of mutual support. Vertical cohesion is best represented by three factors: leader caring for soldiers, NCO involvement with soldiers, and officer involvement with soldiers. Consistently

soldiers who measured higher on horizontal and vertical cohesion scales also measured high in other positive indicators, e.g., psychological well-being, life and Army satisfaction, spouse support, and psychological sense of community.²⁵

The figures below indicate the major trends derived from the two iterations of the Soldier Will Survey.

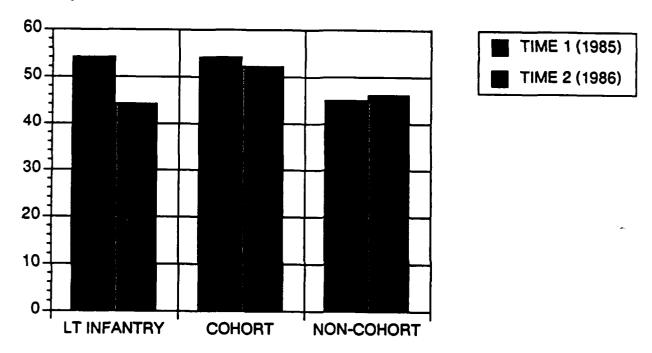


Figure 1. Horizontal Cohesion by Type Unit

Figure 1 indicates a sharp decline in the overall level of horizontal cohesion in light infantry units as compared to other non-light COHORT units (which remained quite high) and nonCOHORT control units. In some cases the nonCOHORT control populations showed increased cohesion while the COHORT units cohesion factors slipped over the intervening period of six to nine months. (Note: In each graph the score is rescaled based on 100 per cent possible positive score.). Examination of Figure 2 below reveals that the decline was consistent across each of the four light battalions participating in the sample.²⁶

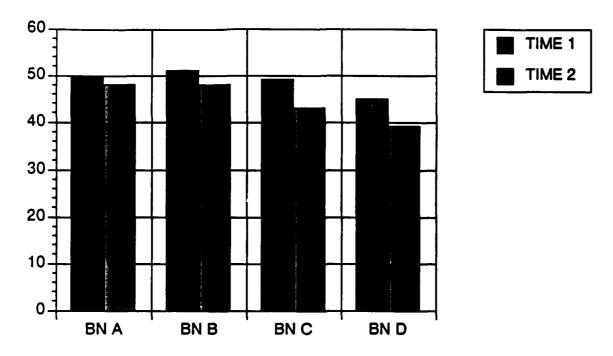


Figure 2. Decline in Horizontal Cohesion by Unit

Figure 3 shows that vertical cohesion in the light infantry battalions declined sharply compared to the control units both COHORT and nonCOHORT.

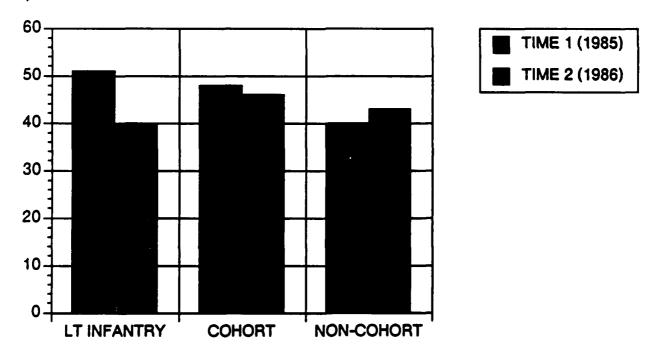


Figure 3. Vertical Cohesion by Type Unit

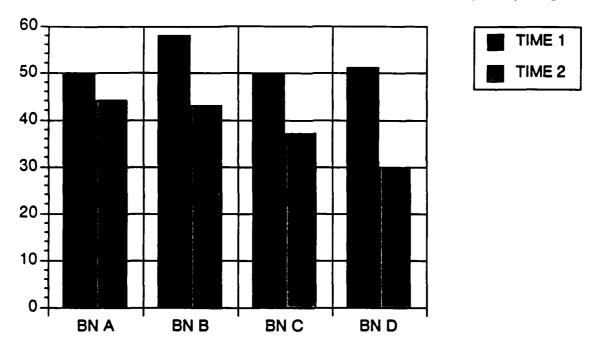


Figure 4 shows that this trend also occurred in each of the four participating battalions.

Figure 4. Decline in Vertical Cohesion by Unit

The Soldier Will Survey cannot and does not explain the causes of these trends. Insight drawn from the interviews and observation phase of the analysis suggests explanations for the negative trends pointed out by the survey results. The major reasons for the decline in cohesion are the subject of the next section. The attempt here is to demonstrate how interpretation of the data regarding vertical and horizontal cohesion was key to informing decision makers on the status of the COHORT program in the 7th ID(L).

COHESION IN THE 7TH ID(L)

When the Soldier Will Survey was first administered to the 7th ID(L), the four battalions scored substantially higher than comparable units both on horizontal cohesion and vertical cohesion. Soldier interviews indicated that several themes ran through these units indicative of high soldier-to-soldier bonding. The COHORT troops showed a strong sense of mutual

caring and helping. Interviews detailed accounts of peers assisting weaker, yet motivated individuals to meet difficult standards of performance established and accepted by the group. Examples are drawn where soldiers stood up for their comrades in official as well as social confrontations. If a soldier spoke poor English, another soldier would likely assist him during training. "Cohesive" soldiers brought forth examples where the troops disciplined themselves. When someone would go AWOL, comrades tracked down and talked to the AWOL soldier about returning to the barracks and military authority. Groups discouraged drug use and other acts of indiscipline and frequently provided high levels of mutual support to avoid addiction or other degenerative behavior.

Another common thread that tended to bind together the COHORT units was a widespread interest in becoming more proficient in military skills. Junior soldiers tended to study manuals in their off-duty time, judged each other on their abilities as soldiers, and were extremely critical of their own performance and that of their unit. The results were levels of knowledge and competence among the new soldiers that experienced, senior NCOs and officers had not seen before. Leaders were almost unanimous in their praise for the first term COHORT light infantryman's motivation to learn.²⁷

The initial measurement of vertical cohesion showed potential for growth and compared favorably with the data from control units. By neglecting certain human dimensions, however, personnel managers and commanders sowed the seeds for future problems. In order to form the light battalions quickly with adequate time to train cadre, orders had diverted many NCOs from other assignments to Fort Ord. Forced to alter plans on short notice under threat of bar to reenlistment, these junior leaders' attitudes may have been spoiled early on. Other NCOs arrived in the division after many years away from line units and soldiers. Some of these suffered from misunderstanding the importance of light infantry conversion and the physical and emotional demands contemplated for light infantry soldiers. Alienated by this treatment and resentful of additional light infantry burdens, some sergeants smothered vertical

cohesion by being unable to lead by example or by using their authority to lead by intimidation. Even the relief, transfer, or elimination of poor NCOs was inimical to vertical cohesion because of resulting turbulence and leader shortages.

As always the quality of junior officers was uneven. When left without strong NCO assistance, weaker lieutenants alienated soldiers by their inability to demonstrate personal competence in certain military skills. Sometimes inexperienced officers failed to show respect for a young soldier that is due a fellow professional. Nevertheless, most junior leaders were successful and effective. By sharing enthusiasm and interests in military skills, soldiers, NCOs, and officers trained and improved each other. Commanders and First Sergeants who encouraged initiative and innovation drew praise from the troops. All expected that vertical cohesion would improve as leaders and soldiers became more accustomed to each other and had shared several difficult training missions.²⁸

When the second iteration Soldier Will questionnaire was administered, results reflected a general lowering of both horizontal and vertical cohesion. Personnel strength declined and, true to the COHORT concept, no replacements arrived. The lower personnel strength, combined with the new missions and increased training tempo, strained the fabric of the newly formed battalions. Concurrently, the differences in the interests of members at each level of command became sharper and communication between echelons became less clear. Loss in vertical cohesion reflected the inability of leaders and soldiers to identify with and commit to the ever expanding and difficult mission. Observations and interviews indicated that horizontal bonding was still much in evidence during the second period of the survey. Nevertheless, the numerical indicators of the Soldier Will Survey showed a relatively sharp drop. Researchers attributed this lower scale score to "negative attitudes toward unit social climate." Results from the second survey showed that Privates perceived the unit environment as less supportive; however, soldier respondents clung to each other increasingly as a defense against the increasing difficulty in the units as well as potential

dangers if the battalion had to go into combat.29

Researchers noted that the 7th ID(L) soldiers did not regard cohesion necessarily as synonymous with friendship. Soldiers who were not friends agreed that in combat both preferred to be with someone they knew, but didn't particularly like, rather than with a stranger. By the time the second year arrived, hard work was taken for granted. The COHORT soldiers had developed group norms that discouraged shirking even when the task was onerous, boring, and difficult. Teamwork was the visible norm and a matter of boasting among the troops who were interviewed.

The COHORT soldiers tended to bond together against superiors who were unreasonable, insensitive, or abusive. This bonding became particularly keen when a member of the group was unfairly treated by a junior officer or NCO. Horizontal bonding demonstrated itself in repeated expressions of concern for fellow soldiers who were physically injured or disabled, especially if a leader was possived to have pushed the soldier beyond reasonable limits. Researchers were satisfied, after interviews and observation, that horizontal cohesion was still an important aspect in the sample units. The scales designed to gauge horizontal cohesion that reflected a significant drop in horizontal cohesion were discredited and required revision after this iteration.

Vertical cohesion suffered the most under the increased pressure of added mission requirements and perceived insensitivity of the chain of command to the impact of the increased pace on the soldiers. Alienation across echelons increased in spite of the expressed wishes of all soldiers, Private through Colonel. The gulf between soldier values and the perception of the leaders' values widened. The WRAIR report that details the results of the survey suggests that four "unofficial, implicit, but traditional" Army practices helped undermine vertical cohesion in the test units:

- -*Can do* mentality of commanders who push[ed] every mission down on their subordinates rather than setting priorities.
- -Belief that subordinates do as little as they can get away with.
- -Punitive response to failure or error.
- -Emphasis on locking good for the duration of every[one's] command tour.30

Even though some leaders resisted these practices, most resorted to more traditional leadership behaviors when placed under added stress. Whether more or different leadership training would have reversed these results is a matter for further study.

The WRAIR report, based upon the numerous interviews and bolstered by the quantitative analysis from the Soldier Will Survey, provided helpful input to Army leaders responsible for implementing COHORT. The condemnation implicit in the paragraph summary below is probably not warranted by the overall successful accomplishments of the 7th ID(L). Most soldiers and units in the Army, COHORT notwithstanding, would have produced similar results under these conditions.

The compromises division leaders felt obliged to make ignored consideration of the processes that support cohesion. Long days in the field, high attrition that reduced...strength to 60 per cent; and insufficient time to learn fundamentals led to fatigue, frustration, and error. Under such pressure...[fearful] leaders then resorted to micro-management, subordination of soldier's interests to an everbroadening interpretation of the mission, and coercion. Community of purpose and mutuality of commitment, the foundations of cohesion, became impossible in this atmosphere poisoned by adversarial relations across echelons.³¹

The 7th ID(L) experience and interim evaluation determined that the COHORT system provided enhanced horizontal cohesion and improved readiness among first term soldiers. Leadership, however, still remains the key--as it always has in military affairs. The ability to inspire subordinates, to encourage identification with the larger unit's mission, and to establish a positive, caring organizational climate are still the role of the leader. Vertical

cohesion must flow from the top down. Unless the quality of both leadership and leaders improves and peacetime training environment become less frantic, vertical cohesion will continue to be elusive even in stable units.

COHORT AND THE HUMAN DIMENSION OF WAR

The WRAIR analysis of the 7th ID(L) units reveals critical information about the creation of effective and cohesive military organizations. The idea that stability is the single most important factor in creating a well-bonded unit is suspect. In light of the above discussion, the traditional view persists that cohesion among soldiers remains primarily the by-product of good leadership combined with important, fulfilling work. If the military mission is viewed as unreasonable or unnecessarily difficult and leaders are unable to motivate the soldiers to achieve the task, then cohesion will suffer as much as in a highly turbulent unit. One definition of cohesion refers to the:

...bonding together of members of an organization in such a way as to sustain their will and commitment to each other, their unit, and their mission.³²

True cohesion among soldiers depends then equally upon the group (each other), the leader (represents the unit), and the mission. Stabilization is a good first step; but, its promise is eroded because ineffective leaders or unreasonable mission requirements detract from the environment required for building cohesion.

COHORT, as described earlier in this paper, is now dead. Vestiges of the program remain; however, infrequently will entire companies or battalions be started from scratch and disestablished after three years. The inefficiency and low readiness caused by total reorganization every three years was more than the system would bear. Instead, soldier replacements now arrive at units, not as individuals, but in groups of 40-60 men. These soldiers attend IET together and derive some bonding from this experience; however, within

battalions, assignment of those soldiers in groups is seldom practical, fair, or efficient in the eyes of the local commanders who exercise their prerogative to break up the in-bound group and replenish the most needy units. This system degenerates rapidly into a form similar in effect to the old individual replacement system. From the bottom up in the organization, it looks very much like the old system. New soldiers arrive in the infantry squad as strangers and individuals. The incorporation of leaders into the unit has returned to the individual replacement paradigm. The future could see a return to the original COHORT model if lowering requirements for OCONUS assignments allow building up of sufficient sustaining base units within CONUS to support rotation into forward deployed theaters of COHORT units.

CONCLUSION

Probably no Army in the world knows more about how soldiers feel about themselves, their peers, their leaders, and their units than does the U.S. Army. The WRAIR evaluations have built an extraordinary data base to study soldier attitudes in the volunteer force. The study of COHORT and the nonCOHORT control group units exceeds any previous effort to measure human dimensions in a peacetime Army. This largely unanalyzed information should be used to shape the Army of the future particularly in leader training and development.

The 7th ID(L) experience, along with information and insights emerging from such events as Operation Just Cause (incursion into Panama, December 1989), may be harbingers of change in the Army's traditional leadership climate. More importantly for leadership in the Army is the simple fact that our first generation COHORT soldiers who chose to stay in the Army are now the professional NCOs charged with leading the teams, squads, and platoons of the future. Their experience in the early COHORT units is the best foundation upon which to build cohesion and effective leadership in the future.

ENDNOTES

- 1. The Unit Manning System (UMS) was originally called the New Manning System (NMS) when it included a component of the revised Regimental system. The name was changed in 1986.
- 2. James A. Martin, "Overview", <u>New Manning System Field Evaluation: Technical report No. 1</u>, ed. by D. H. Marlowe, p. I-1.
- 3. D.H Marlowe, "The New Manning System: The Human Aspects of the Evaluation", New Manning System Field Evaluation: Technical Report No. 1, p. III-2.
- 4. D.H. Marlowe, ed. New Manning System Field Evaluation, Technical Report No. 1, p. III-2.
 - 5. T.R. Phillips, ed. ,Roots of Strategy, pp. 118-119.
 - 6. Wm. Darryl Henderson, Cohesion the Human Element in Combat, p. 3.
 - 7. Roger Spiller, "The Tenth Imperative," Military Review, Apr 1989, p. 4.
 - 8. Ardant du Picq, Battle Studies. Ancient and Modern, p. 109.
 - 9. <u>Ibid.</u>, pp. 39-40.
 - 10. Ibid., p. 110.
 - 11. Ibid., p. 122.
 - 12. <u>Ibid</u>., p. 96.
- 13. Samuel Andrew Stouffer, et al., The American Soldier: Adjustment During Army Life, pp 136-137.
- 14. S.L.A. Marshall, Men against Fire: The Problem of Battle Command in Future War, p. 160.
 - 15. <u>Ibid</u>., p. 42-43.
- 16. Andrew J. Bachevich, <u>The Pentomic Era: The U.S. Army Between Korea and Vietnam</u>, p. 121.
 - 17. Marshall, p. 156.
 - 18. Richard Holmes, Acts of War, p. 261.
 - 19. <u>Ibid.</u>, p. 262.
 - 20. Richard A. Gabriel and Paul L.Savage, Crisis in Command, p. 40.
- 21. D.H. Marlowe, ed. New Manning System Field Evaluation: Technical Report No. 5, p. 4.

- 22. Chief of Staff, U.S. Army, White Paper 1984: Light Infantry Divisions, p. 3.
- 23. <u>Ibid</u>. p. 2.
- 24. Marlowe, pp. 1-2.
- 25. James Griffith and Mark Viatkus, "The Measurement of Soldier Will, Horizontal Cohesion and Vertical Cohesion and Their Relationship to Training Performance and Unit Replacement," New Manning System Field Evaluation: Technical Report No. 1, Chapter V, n.p.
 - 26. <u>Ibid</u>.
 - 27. <u>Ibid.</u>, p. 12.
 - 28. <u>Ibid.</u>, p. 3.
 - 29. <u>Ibid</u>., p. 14.
 - 30. Ibid., p. 22.
 - 31. Ibid.
 - 32. Wm. Darryl Henderson, Cohesion the Human Element in Combat. p. 4..4.

BIBLIOGRAPHY

- Bacevich, Andrew J. <u>The Pentomic Era: The U.S. Army Between Korea and Vietnam</u>. Washington: National Defense University Press, 1986.
- Bassford, Christopher. <u>The Spitshine Syndrome: Organizational Irrationality in the American Field Army</u>. Westport, CT: Greenwood Press, 1988.
- Bradford, Zeb B. and Fredrick J. Brown. <u>The United States Army in Transition</u>. Beverly Hills, CA: SAGE Publications, 1973.
- Chief of Staff, U.S. Army. White Paper 1984: Light Infantry Divisions. Washington: Department of the Army, 16 april 1984.
- ---. White Paper 1985: Leadership "Makes the Difference". Washington: Department of the Army, 1 April 1985.
- Cincinnatus. [pseud.] <u>Self-destruction</u>, the <u>Disintegration and Decay of the United States</u>
 Army During the Vietnam Era. New York: Norton, 1981.
- "COHORT Unit Expansion Program, Package Replacement System: An Informational Guide for Personnel Managers." Washington: U.S. Army, Office of the Deputy Chief of Staff for Personnel, n.d.
- du Picq, Ardant. <u>Battle Studies, Ancient and Modern</u>. Harisburg, PA: Military service Publishing Co., 1946.
- English, John A. On Infantry. New York: Praeger Special Studies, 1981.
- Furukawa, Theodore P., et. al., 'Evaluating the Unit Manning System: Lessons Learned to Date.' Washington: Dept of Psychiatry, Walter Reed Army Institute of Research, August 1987.
- Gabriel, Richard A. and Paul L. Savage <u>Crisis in Command</u>. New York: Hill and Wang, 1978.
- Griffith, James and Mark Vaitkus. "The Measurement of 'Soldier Will,' Horizontal Cohesion, and Vertical Cohesion and Their relationship to Training Performance and Unit replacement System." New Manning System Field Evaluation: Technical Report No. 3. ed. D.H. Marlowe. Washington: Walter Reed Army Institute od Research, 1 Jun 1986.
- Griffith, James. 'The Measurement of 'Soldier Will,' New Manning Sytem Field Evaluation:

 Technical Report No. 1. Ed. D.H. Marlowe. Washington: Walter Reed Army Institute of Research, 1 Nov 1985.
- Hauser, William L. <u>America's Army in Crisi</u>s: <u>A Study in Civil Military Relations</u>. Baltimore, MD: Johns Hopkins University Press, 1973.

- Henderson, Wm Darryl. <u>Cohesion the Human Element in Combat</u>. Washington: Nastional Defense University Press, 1985.
- Holmes, Richard. Acts of War. New York: The Free Press, 1986.
- Holzwarth, Donald R. "Cohesion Building in the Training Base: A New Perspective." U.S. Army War College, Carlisle Barracks, PA, 9 Mar 1988.
- Ingraham, Larry H. and Fredrick J. Manning. "An Investigation into the Value of Unit Cohesion in Peacetime." Washington: Walter Reed Army Institute of Research, n.d.
- Ingraham, Larry.H. 'Caring Is Not Enough: An Uninvited talk to Army Leaders.' Military Review, Dec 1987: pp.
- Johns, John H. et. al. <u>Cohesion in the U.S. Mllitary</u>. Washington: National Defense University Press, 1984.
- Kellett, Anthony. <u>Combat Motivation: The Behavior of Soldiers in Battle</u>. Boston: Kluwer-Nijhoff Publications, 1982.
- Krepinevich, Andrew F. <u>The Army and Vietnam</u> Baltimore, MD: Johns Hopkins University Press, 1986.
- Malone, Dandridge M. Small Unit Leadership: A Commonsense Approach. Novato, CA: Presidio, 1983.
- Marlowe, D.H. ed. New Manning System Field Evaluation: Technical Report No. 1. Washington: Walter Reed Army Institute of Research, 1 Nov 1985.
- ---. New Manning System Field Evaluation: Technical Report No. 2. Walter Reed Army Institute of Research, 1 Mar 1986.
- ---. New Manning System Field Evaluation: Technical Report No. 3. Walter Reed Army Institute of Research, 1 Jun 1986.
- ---. New Manning System Field Evaluation: Technical Report No. 4. Washington: Walter Reed Army Institute of Research, 15 Dec 1986.
- ---. New Manning System Field Evaluation: Technical Report No. 5. Washington: Walter Reed Army Institute of Research, 1 Jun 1986.
- ---. "Cohesion, Anticipated Breakdown, and Endurance in Battle: Consideration for Severe and High Intensity Combat." (Draft) Washington: Walter Reed Army Institute of Research, 1979.
- Marshall, S.L.A. Men Against Fire. New York: William Morrow, 1947.

- Martin, James A. "Overview." New Manning System Field evaluation: Technical Report No. 1. ed. D.H. Marlowe. Washington: Walter Reed Army Institute of Research, 1 Dec 1985. I, 1-5.
- Moskos, Charles. "The Sociology of the All Volunteer Force." Toronto, Canada: American Sociological Association, Aug 1981.
- Phillips, T.R. Brig. Gen., ed. Roots of Strategy. Harisburg, PA: Stackpole Books, 1985.
- Phipps, Jeremy J.J. <u>Unit Cohesion: A Prerequisite for Combat Efectiveness</u>. National Security Affairs Issue Paper Series 82-3. Washington: National Defense University Research directorate, 1982.
- Sarkesian, Sam C., ed. <u>Combat Effectiveness: Cohesion, Stress, and the Volunteer Military</u>. Beverly Hills, CA: SAGE Publications, 1980.
- Siebold, Guy L. "Conceptualizations and Definitions of Military Unit Cohesiveness." 95th Annual Convention of American Psychological Association of New York City, 28 Aug-15 Sep 1987.
- Spiller, Roger J. 'The Tenth Imperative.' Military Review, Apr 1989: 2-13.
- Stouffer, Samuel Andrew. et. al. <u>The American Soldier: Adjustment During Army Life</u>. Princeton, NJ: Princeton University Press, 1949.
- Straub, Christopher C. <u>The Unit First: Keeping the Promise of Cohesion</u>. Washington: National Defense University Press, 1988.
- U.S. Army. <u>Army Regulation 600-83. The New Manning System-COHORT Unit Replacement System.</u> Washington: Department of the Army, 27 Oct 1986.
- U.S. Army. "Battalion Rotation After Action Report." Washington: Dept of the Army, Office of the Deputy Chief of Staff for Research, Aug 1987.